UNITED STATES ENVIRONMENTAL PROTECTION AGENCY REGION III 1650 Arch Street Philadelphia, Pennsylvania 19103-2029

SUBJECT: Toxicological Review of HW12 Data 12 March 2012

Dimock, PA

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On 26 January 2012, U.S. EPA collected water samples from HW12 in Dimock. The samples were analyzed for over 200 constituents, including volatile organic compounds, semi-volatile compounds, metals and bacteria. The analytical results were then validated and compared to risk-based screening levels and/or standards for public drinking water supplies.

In HW12, methane was detected at 52,000 ug/L. A quantitative assessment of risk cannot be performed for methane, nor does U.S. EPA have a drinking water standard for this compound. However, the Department of Interior (Office of Surface Mining Reclamation and Enforcement) has established a Recommended Action Level of 28,000 ug/L for dissolved methane in drinking water. This value is based on the potential threat of explosion associated with methane in confined environments. The potential for methane in air to create an explosive environment depends on a number of factors, such as the concentration, the volume of the space and the frequency of air exchanges in the space. Proper room ventilation will ensure that methane levels in indoor air do not present a safety hazard.

Arsenic was also observed in HW12 at up to 6 ug/L in an unfiltered sample. While this concentration slightly exceeds the risk-based screening level for arsenic in tap water (4.5 ug/L), it is less than the enforceable drinking standard for public water supplies (10 ug/L).

No other constituents were detected at levels of concern in this well.

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